

SABIC® LLDPE M500026

LINEAR LOW DENSITY POLYETHYLENE

DESCRIPTION

M500026 is a Linear Low Density Polyethylene grade with narrow molecular weight distribution suitable for injection molding applications. It has been designed to give excellent flow properties with better low temperature toughness, stress crack resistance and gloss.

TYPICAL APPLICATIONS

Lids for closures and containers and deep draw houseware products, automotive parts.

TYPICAL PROPERTY VALUES

Revision 20170605

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
POLYMER PROPERTIES			
Melt Flow Rate			
at 190 °C and 2.16 kg	50	g/10 min	ASTM D1238
Density ^{(1) (2)}	926	kg/m ³	ASTM D1505
MECHANICAL PROPERTIES ^{(1) (2)}			
Tensile test			
strain at break	120	%	ASTM D638
Tensile test			
stress at yield	13	MPa	ASTM D638
stress at break	12.4	MPa	ASTM D638
secant modulus at 1% elongation	354	MPa	ASTM D638
Izod impact notched at 23 °C	450	J/m	ASTM D256
Hardness Shore D	55	-	ASTM D2240
ESCR	2	h	ASTM D1693
ESCR (100% Igepal CO-630), F50	2	h	ASTM D1693A
THERMAL PROPERTIES ^{(1) (2)}			
Brittleness Temperature	< -75	°C	ASTM D746
Vicat softening temperature			
at 10 N (VST/A)	88	°C	ASTM D1525

(1) Test specimens are prepared from compression moulded sheet made according to ASTM D 1928 Procedure C.

(2) Test specimens are prepared from compression moulded sheet made according to ASTM D 1928 Procedure C.

PROCESSING CONDITIONS

Typical processing conditions for M500026 are:

Barrel temperature: 180 - 230°C

Mold temperature: 15 - 60 °C

Injection pressure: 600 - 1000 Bar

HEALTH, SAFETY AND FOOD CONTACT REGULATIONS

M500026 is suitable for Food contact application. Detailed information is provided in relevant Material Safety Datasheet and for additional specific information please contact SABIC local representative for certificate.

DISCLAIMER: This product is not intended for and must not be used in any pharmaceutical/medical applications.

STORAGE AND HANDLING

Polyethylene resin should be stored in a manner to prevent a direct exposure to sunlight and/or heat. The storage area should also be dry and preferably do not exceed 50°C. SABIC would not give warranty to bad storage conditions which may lead to quality deterioration such as color change, bad smell and inadequate product performance. It is advisable to process PE resin within 6 months after delivery.

DISCLAIMER

The information contained herein may include typical properties of our products or their typical performances when used in certain typical applications. Actual properties of our products, in particular when used in conjunction with any third party material(s) or for any non-typical applications, may differ from typical properties.

It is the customer's responsibility to inspect and test our product(s) in order to satisfy itself as to the suitability of the product(s) for its and its customers particular purposes. The customer is responsible for the appropriate, safe and legal use, processing and handling of all product(s) purchased from us.

Nothing herein is intended to be nor shall it constitute a warranty whatsoever, in particular, warranty of merchantability or fitness for a particular purpose.

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